

IN THE CLAIMS

Please amend the claims as follows:

Claim 1 (Currently Amended): A toner comprising:

a binder resin comprising a crystalline polyester and a non-crystalline resin;

a release agent; and

a black metal-containing material having a saturation magnetization not greater than 50 emu/g;

wherein the black metal-containing material is a titanium-containing iron oxide.

Claim 2 (Original): The toner according to Claim 1, wherein the black metal-containing material has a color such that L*, a* and b* values of the color is not greater than 15, from -1.0 to 1.0 and from -1.0 to 1.0, respectively.

Claim 3 (Canceled).

Claim 4 (Currently Amended): The toner according to Claim [[3]] 1, wherein the titanium-containing iron oxide includes titanium in an amount of from 10 to 45 % by weight based on iron atom included in the titanium-containing iron oxide.

Claim 5 (Original): The toner according to Claim 1, wherein the black metal-containing material has a specific surface area of from 1.5 to 30 m²/g.

Claim 6 (Original): The toner according to Claim 1, wherein the black metal-containing material has a true specific gravity of from 4.0 to 5.0.

Claim 7 (Original): The toner according to Claim 1, wherein the black metal-containing material is included in the toner in an amount of from 10 to 50 parts by weight per 100 parts by weight of the binder resin.

Claim 8 (Original): The toner according to Claim 1, wherein the toner has an X-ray diffraction spectrum such that at least one diffraction peak is observed at a Bragg (2θ) angle of from 20° to 25° .

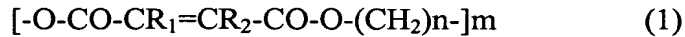
Claim 9 (Original): The toner according to Claim 1, wherein the non-crystalline resin comprises a polyester resin.

Claim 10 (Original): The toner according to Claim 1, wherein the crystalline polyester is included in an amount not greater than 50 % by weight based on the total weight of the binder resin.

Claim 11 (Original): The toner according to Claim 1, wherein the crystalline polyester has a melting point of from 80 to 130°C .

Claim 12 (Original): The toner according to Claim 1, wherein the crystalline polyester has an X-ray diffraction spectrum such that at least one diffraction peak is observed in each of Bragg (2θ) angle ranges of from 19° to 20° , from 21° to 22° , from 23° to 25° and from 29° to 31° .

Claim 13 (Original): The toner according to Claim 1, wherein the crystalline polyester has the following formula (1):



wherein n and m independently represents an integer; and R₁ and R₂ independently represent a hydrocarbon group.

Claim 14 (Original): The toner according to Claim 1, wherein the non-crystalline resin has a glass transition temperature of from 40 to 70°C, and an F1/2 temperature of from 120 to 160°C.

Claim 15 (Original): The toner according to Claim 1, wherein the release agent has a melting point of from 70 to 90°C.

Claim 16 (Original): The toner according to Claim 1, wherein the toner has a volume average particle diameter of from 2.5 to 10 μm.

Claim 17 (Original): A toner container containing the toner according to Claim 1.

Claim 18 (Original): A method for fixing an image of the toner according to Claim 1, comprising:

passing a support with the toner image thereon through a nip between two cylindrical rollers while applying a pressure not greater than 1×10^5 Pa to the two cylindrical rollers, wherein one of the cylindrical rollers which contacts the toner image has a thickness not greater than 1.0 mm.

Claim 19 (Original): An developing method comprising:

developing an electrostatic latent image on an image bearing member with the toner according to Claim 1 to form a toner image on the image bearing member.

Claim 20 (Previously Presented): An image forming method comprising:

developing an electrostatic latent image on an image bearing member with the toner according to Claim 1 to form a toner image on the image bearing member;

transferring the toner image onto a receiving material optionally via an intermediate transfer member; and

fixing the toner image on the receiving material by passing a support with the toner image thereon through a nip between two cylindrical rollers while applying a pressure not greater than 1×10^5 Pa to the two cylindrical rollers, wherein one of the cylindrical rollers which contacts the toner image has a thickness not greater than 1.0 mm.

Claim 21 (Original): A process cartridge for an image forming apparatus, comprising:

an image bearing member configured to bear an electrostatic latent image thereon; and

a developing device configured to develop the electrostatic latent image with a developer comprising a toner to form a toner image on the image bearing member, wherein the toner is the toner according to Claim 1.

Claim 22 (Previously Presented): The toner according to Claim 1, including no carbon black.

Claim 23 (Canceled).

Claim 24 (Previously Presented): The toner according to Claim 1, wherein the crystalline polyester is present in an amount of from 3 to 30% by weight based on the total weight of the binder resin.

Claim 25 (Previously Presented): The toner according to Claim 1, wherein the crystalline polyester comprises reacted units of fumaric acid, 1,4-butanediol, and 1,6-hexanediol and the non-crystalline resin comprises reacted units of fumaric acid, terephthalic acid and trimellitic anhydride.

Claim 26 (Previously Presented): The toner according to Claim 25, wherein the metal-containing material comprises Fe, Mn, Cu, and Ti.

Claim 27 (Previously Presented): The toner according to Claim 1, wherein the crystalline polyester comprises reacted units of fumaric acid, succinic acid, ethylene glycol, and 1,6-hexanediol; the non-crystalline resin comprises reacted units of fumaric acid, terephthalic acid and trimellitic anhydride; and the metal-containing material comprises Fe and Ti.

Claim 28 (Previously Presented): The toner according to Claim 1, wherein the black metal-containing material comprises an iron oxide and has a specific surface area of from 1.3 to 80 m²/g.

Claim 29 (New): A toner comprising:

a binder resin comprising a crystalline polyester and a non-crystalline resin;
a release agent; and
a black metal-containing material having a saturation magnetization not greater than 50 emu/g;
wherein the crystalline polyester is present in an amount of no greater than 50% by weight based upon the total weight of the binder resin.

Claim 30 (New): The toner according to Claim 29, wherein the black metal-containing material has a color such that L*, a* and b* values of the color is not greater than 15, from -1.0 to 1.0 and from -1.0 to 1.0, respectively.

Claim 31 (New): The toner according to Claim 29, wherein the black metal-containing material is a titanium-containing iron oxide.

Claim 32 (New): The toner according to Claim 31, wherein the titanium-containing iron oxide includes titanium in an amount of from 10 to 45 % by weight based on iron atom included in the titanium-containing iron oxide.

Claim 33 (New): The toner according to Claim 29, wherein the black metal-containing material has a specific surface area of from 1.5 to 30 m²/g.

Claim 34 (New): The toner according to Claim 29, wherein the black metal-containing material has a true specific gravity of from 4.0 to 5.0.

Claim 35 (New): A toner container containing the toner according to Claim 29.

Claim 36 (New): A method for fixing an image of the toner according to Claim 29, comprising:

passing a support with the toner image thereon through a nip between two cylindrical rollers while applying a pressure not greater than 1×10^5 Pa to the two cylindrical rollers, wherein one of the cylindrical rollers which contacts the toner image has a thickness not greater than 1.0 mm.

Claim 37 (New): An image forming method comprising:

developing an electrostatic latent image on an image bearing member with the toner according to Claim 29 to form a toner image on the image bearing member;

transferring the toner image onto a receiving material optionally via an intermediate transfer member; and

fixing the toner image on the receiving material by passing a support with the toner image thereon through a nip between two cylindrical rollers while applying a pressure not greater than 1×10^5 Pa to the two cylindrical rollers, wherein one of the cylindrical rollers which contacts the toner image has a thickness not greater than 1.0 mm.

Claim 38 (New): A process cartridge for an image forming apparatus, comprising:

an image bearing member configured to bear an electrostatic latent image thereon; and

a developing device configured to develop the electrostatic latent image with a developer comprising a toner to form a toner image on the image bearing member, wherein the toner is the toner according to Claim 29.

Claim 39 (New): The toner according to Claim 29, wherein the crystalline polyester is present in an amount of from 3 to 30% by weight based on the total weight of the binder resin.

Claim 40 (New): The toner according to Claim 29, wherein the crystalline polyester comprises reacted units of fumaric acid, 1,4-butanediol, and 1,6-hexanediol and the non-crystalline resin comprises reacted units of fumaric acid, terephthalic and trimellitic anhydride.

Claim 41 (New): A toner comprising:
a binder resin comprising a crystalline polyester and a non-crystalline resin;
a release agent; and
a black metal-containing material having a saturation magnetization not greater than 50 emu/g;
wherein the crystalline polyester is present in an amount of from 3 to 30% by weight based upon the total weight of the binder resin.

Claim 42 (New): The toner according to Claim 41, wherein the black metal-containing material has a color such that L*, a* and b* values of the color is not greater than 15, from -1.0 to 1.0 and from -1.0 to 1.0, respectively.

Claim 43 (New): The toner according to Claim 41, wherein the black metal-containing material is a titanium-containing iron oxide.

Claim 44 (New): The toner according to Claim 43, wherein the titanium-containing iron oxide includes titanium in an amount of from 10 to 45 % by weight based on iron atom included in the titanium-containing iron oxide.

Claim 45 (New): The toner according to Claim 41, wherein the black metal-containing material has a specific surface area of from 1.5 to 30 m²/g.

Claim 46 (New): The toner according to Claim 41, wherein the black metal-containing material has a true specific gravity of from 4.0 to 5.0.

Claim 47 (New): A toner container containing the toner according to Claim 41.

Claim 48 (New): A method for fixing an image of the toner according to Claim 41, comprising:

passing a support with the toner image thereon through a nip between two cylindrical rollers while applying a pressure not greater than 1×10^5 Pa to the two cylindrical rollers, wherein one of the cylindrical rollers which contacts the toner image has a thickness not greater than 1.0 mm.

Claim 49 (New): An developing method comprising:

developing an electrostatic latent image on an image bearing member with the toner according to Claim 41 to form a toner image on the image bearing member.

Claim 50 (New): An image forming method comprising:

developing an electrostatic latent image on an image bearing member with the toner according to Claim 41 to form a toner image on the image bearing member;

transferring the toner image onto a receiving material optionally via an intermediate transfer member; and

fixing the toner image on the receiving material by passing a support with the toner image thereon through a nip between two cylindrical rollers while applying a pressure not greater than 1×10^5 Pa to the two cylindrical rollers, wherein one of the cylindrical rollers which contacts the toner image has a thickness not greater than 1.0 mm.

Claim 51 (New): A process cartridge for an image forming apparatus, comprising:
an image bearing member configured to bear an electrostatic latent image thereon;
and

a developing device configured to develop the electrostatic latent image with a developer comprising a toner to form a toner image on the image bearing member,
wherein the toner is the toner according to Claim 41.

DISCUSSION OF THE AMENDMENT

Claims 1-2, 4-22 and 24-51 are active in the present application. Claims 3 and 23 are canceled claims. Claims 29-51 are new claims. Support for the new claims is found in the previously presented claims.

No new matter is added.